

#### **DETERMINATION OF NON-SIGNIFICANCE**

Proposal Name: Belvedere HOA Restoration

Proposal Addresses: 5247, 5315, 5337 145<sup>th</sup> PI SE

**Proposal Description:** Critical Areas Land Use Permit approval for Vegetation

Management on parcels addressed 5247, 5315, and 5337 to restore unpermitted vegetation removal that has occurred within a steep slope, steep slope buffer, and stream buffer. Unpermitted vegetation clearing associated with Enforcement Actions 19-118456-EA

and 19-119140-EA.

File Number: 20-104533-LO

Applicant: Xiaolong Ouyang

**Decisions Included:** Critical Areas Land Use Permit

(Process II. LUC 20.30P)

Planner: David Wong, Land Use Planner

State Environmental Policy Act

Threshold Determination: Determination of Non-Significance

Heidi Bedwell, Planning Manager

Elizabeth Stead, Environmental Coordinator

**Development Services Department** 

Director's Decision: Approval with Conditions

Heidi Bedwell, Planning Manager

Elizabeth Stead, Land Use Director Development Services Department

Application Date: March 9, 2020

Notice of Application Publication Date: July 16, 2020

Decision Publication Date: October 29, 2020

Project/SEPA Appeal Deadline: November 12, 2020

For information on how to appeal a proposal, visit Development Services Center at City Hall or call (425) 452-6800. Comments on State Environmental Policy Act (SEPA) Determinations can be made with or without appealing the proposal within the noted comment period for a SEPA Determination. Appeal of the Decision must be received in the City's Clerk's Office by 5 PM on the date noted for appeal of the decision.

#### I. Proposal Description

The applicant is requesting a Critical Areas Land Use Permit (CALUP) to restore conditions created by unpermitted vegetation clearing and tree removal on 5247, 5315, and 5337 145<sup>th</sup> PI SE. The proposal includes a restoration planting area of approximately 3,921 SF of native vegetation planting on lots 5247 & 5315 and tree replacement on lot 5337.

Per LUC 20.25H.055.C.3.(i)iv a CALUP is required because the proposed vegetation management activities are located within a critical area and critical area buffer.



# II. Consistency with Land Use Code Requirements

Vegetation Management Plan Performance Standards LUC 20.25H.055.C.3.v.i

	Is the Vegetation Management Plan prepared by a qualified professional? $\boxtimes$ or No $\square$ scribe:
	Plan Preparer's Name: Meryl Kamowski, Senior Ecologist Company: Wetland Resources Address: 9505 19 <sup>th</sup> Ave SE Ste. 106, Everett, WA 98208 Phone: 425-337-3174
	Statement of Qualifications: Senior Ecologist
(B)	Does the Vegetation Management Plan include the following?  (1) A description of existing site conditions, including existing critical area functions and values;  Yes ⋈ or No □
	Describe: The site contains a native growth protection easement (NGPE), steep slope, steep slope buffer, and stream buffer that were impacted by approximately 3,900 SF of unpermitted clearing of vegetation and trees in 2019. Removed vegetative cover provided slope stability, stormwater treatment, and habitat opportunity within the critical areas and their buffers. Portions of the affected area were/are covered by non-native English ivy (Hedera helix).
	(2) A site history; Yes ⊠ or No □ Describe: The Belvedere short plat development was approved by the City of Bellevue in 1990 and included a native growth protection easement and undevelopable tract (Tract B) containing steep slopes, a stream, and their respective buffers. The buildable parcels (5247 and 5337) were developed with single-family dwellings between 1990 and 2000. In 2019, unpermitted vegetation clearing occurred on all three parcels, and mainly composed of the removal of young and mature alders ( <i>Alnus rubra</i> ).
	(3) A discussion of the plan objectives; Yes ⋈ or No □ Describe: The general objective of the plan is to restore the affected area with native species appropriate for steep slopes, steep slope buffers, and stream buffers, and to control
	non-native, invasive plant cover within the vegetation management area.
	(4) A description of all sensitive features; Yes $oxtimes$ or No $oxtimes$
	Describe: The site contains geologic hazard steep slopes, a Type-N stream and their

associated buffers. See the attached Vegetation Management Plan (Section 3.1 and 3.3) for a more detailed description of all critical areas and their buffers.

(5) Identification of soils, existing vegetation, and habitat associated with species of local importance present on the site; Yes $\boxtimes$ or No $\square$ Describe: Soils at the site have been mapped as Beausite gravelly sandy loam (BeD).
Vegetation at the site was observed and documented to contain a mix of natives, including but not limited to Douglas-fir ( <i>Pseudotsuga menziesii</i> ), bigleaf maple ( <i>Acer macrophyllum</i> ), red alder ( <i>Alnus rubra</i> ), osoberry ( <i>Oemleria cerasiformis</i> ), salmonberry ( <i>Rubus spectabilis</i> ), dull oregon grape ( <i>Mahonia nervosa</i> ), sword fern ( <i>Polystichum munitum</i> ), and non-native and invasive species (See Section 3.2).
(6) Allowed work windows; Yes ⊠ or No □ Describe: The applicant has included a 5-year maintenance and monitoring plan and has provided detailed information regarding actions that can occur within each of the five years. Due to proximity to the stream and steep slopes, work during rainy season months is restricted. See Section VII for conditions of approval.
(7) A clear delineation of the area within which clearing and other vegetation management practices are allowed under the plan; and Yes $\boxtimes$ or No $\square$ Describe: A restoration area map and planting plan are included with the vegetation management plan
(8) Short- and long-term management prescriptions, including characterization of trees and vegetation to be removed, and restoration and revegetation plans with native species, including native species with a lower growth habit. Such restoration and revegetation plans shall demonstrate that the proposed Vegetation Management Plan will not significantly diminish the functions and values of the critical area or alter the forest and habitat characteristics of the site over time. Yes $\boxtimes$ or No $\square$
Describe: The plan provides short- and long-term management goals for vegetation located within the parcels. Short-term goals include planting and establishment of native species and invasive vegetation removal. The long-term goals include sustainable species diversity, improved stormwater quality, and greater protection against erosion to the slope. See section 7.1 of vegetation management plan for specific metrics. Any use of herbicides for the control of vegetation within the planting area is subject to City of Bellevue environmental best management practices. See Section VII for conditions of approval.

(C) V	Nould any proposed tree removal result in a significant impact to habitat associated with
species	of local importance?
Yes □ c	or No ⊠
unpermi native tra li s	e: No additional tree removal is proposed. Proposal is to restore an area where litted tree removal has occurred, and the proposed replanting includes small to large ees and shrubs.  If yes, can the impacted function be replaced elsewhere within the management area subject to the plan?  If yes \( \subseteq \text{ or No } \subseteq \)  Describe:
covenan	s the area under application subject to any applicable neighborhood restrictive atts that address view preservation or vegetation management? The existence of and ans of neighborhood restrictive covenants shall not be entitled to any more or less weight her reports and materials in the record.

#### **III. Public Notice and Comment**

If yes, describe:

Application Date: March 9, 2020
Public Notice (500 feet): July 16, 2020
Minimum Comment Period: July 30, 2020

The Notice of Application for this project was published in the City of Bellevue weekly permit bulletin on October 10, 2018. It was mailed to property owners within 500 feet of the project site. No comments have been received from the public as of the writing of this staff report.

# IV. State Environmental Policy Act (SEPA)

The environmental review indicates no probability of significant adverse environmental impacts occurring as a result of the proposal. The attached Environmental Checklist submitted with the application adequately discloses expected environmental impacts associated with the project. The City codes and requirements, including the Clear and Grade Code, Utility Code, Land Use Code, Noise Ordinance, Building Code and other construction codes are expected to mitigate potential environmental impacts. Therefore, issuance of a Determination of Non-Significance (DNS) is the appropriate threshold determination under the State Environmental Policy Act (SEPA) requirements.

# V. Critical Areas Land Use Permit Decision Criteria LUC 20.30P.140

	Director may approve or approve with modifications an application for a Critical Areas Land Permit if:
A.	The proposal obtains all other permits required by the Land Use Code; and Yes $\boxtimes$ or No $\square$
	Describe: The proposal is required to obtain a Clearing & Grading Permit in Critical Areas Permit (GJ) prior to commencing work under this proposal.
B.	The proposal utilizes to the maximum extent possible the best available construction, design and development techniques which result in the least impact on the critical area and critical area buffer; and Yes $\boxtimes$ or No $\square$
	Describe: The proposal utilizes the best available design for vegetation management by restoring the entire affected area with a diverse group of native species that are appropriate for steep slope, steep slope buffer, and stream buffer and that meet spacing requirements of the Critical Areas Handbook. The proposal includes plans for maintenance and monitoring over a 5-year period and provides a financial assurance to ensure success of the restoration area.
C.	The proposal incorporates the performance standards of Part 20.25H LUC to the maximum extent applicable; and Yes $\boxtimes$ or No $\square$
	Describe: As discussed in Section II, the proposal has demonstrated compliance with the performance standards for vegetation management within a critical area.
D.	The proposal will be served by adequate public facilities including streets, fire protection, and utilities; and Yes $\boxtimes$ or No $\square$
	Describe: The site is currently served by adequate public facilities. The proposal will not increase the need for public facilities on the site.
E.	The proposal includes a mitigation or restoration plan consistent with the requirements of LUC 20.25H.210; except that a proposal to modify or remove vegetation pursuant to an approved Vegetation Management Plan under LUC 20.25H.055.C.3.i shall not require a mitigation or restoration plan; and Yes $\boxtimes$ or No $\square$
	Describe: The proposal includes a restoration plan meeting the recommendations of the Critical Areas Handbook and that is consistent with the requirements of LUC 20.25H.210. See Section VII for conditions of approval.

F. The proposal complies with other applicable requirements of this code.

Yes ⊠ or No □

Describe: Demonstration of compliance with the other applicable requirements of the Bellevue City Code will be completed under the review of the required clearing and grading permit.

#### VI. Conclusion and Decision

After conducting the various administrative reviews associated with this proposal, including Land Use Code consistency, SEPA, City Code and Standard compliance reviews, the Director of the Development Services Department does hereby **approve with conditions** the vegetation management plan within 5247, 5315, and 5337 145<sup>th</sup> PI SE.

<u>Note- Expiration of Approval:</u> In accordance with LUC 20.30P.150.B, the Critical Areas Land Use Permit for Vegetation Management is valid for a period of no greater one (1) year after the effective date of the approval.

### VII. Conditions of Approval

The applicant shall comply with all applicable Bellevue City Codes and Ordinances including but not limited to:

Applicable Ordinances	Contact Person
Clearing and Grading Code- BCC 23.76	Janney Gwo 425-452-6190
Land Use Code- BCC 20.25H	David Wong, 425-452-4282
Noise Control- BCC 9.18	David Wong, 425-452-4282

The following conditions are imposed under the Bellevue City Code or SEPA authority referenced:

1. Clearing & Grading Permit Required: A Clearing & Grading Permit is required to conduct work specified in the plans referenced in this approval.

Authority: Land Use Code 20.30P.140
Reviewer: David Wong, Land Use

2. **Mitigation/Replacement Plan:** A restoration plan conforming to the conceptual plan submitted under this application by Wetland Resources shall be included with the Clearing & Grading Permit application. Plans shall meet all requirements for submission as specified on the Forms and Publications webpage on the City's website.

Authority: Land Use Code 20.25H.220.B

Reviewer: David Wong, Land Use

**3. Maintenance & Monitoring:** To ensure establishment occurs and long-term viability is assured, a yearly monitoring report demonstrating compliance with performance standards in the plan shall be emailed to <a href="mailto:DWong@Bellevuewa.gov">DWong@Bellevuewa.gov</a> or submitted to the Development Services Department for a period of five (5) years.

Environmental Planning Manager Development Services Department City of Bellevue PO Box 90012 Bellevue, WA 98009-9012

Authority: Land Use Code 20.25H.220.D

Reviewer: David Wong, Land Use

**4. Rainy Season restrictions:** Due to the proximity to steep slope and stream critical areas, no clearing and grading activity may occur during the rainy season, which is defined as October 1 through April 30 without written authorization of the Development Services Department. Should approval be granted for work during the rainy season, increased erosion and sedimentation measures, representing the best available technology must be implemented prior to beginning or resuming site work.

Authority: Bellevue City Code 23.76.093.A Reviewer: Janney Gwo, Clearing and Grading

**5. Pesticides, Insecticides, and Fertilizers:** The applicant must submit as part of the required Clearing and Grading Permit information regarding the use of pesticides, insecticides, and fertilizers in accordance with the City of Bellevue's "Environmental Best Management Practices".

Authority: Land Use Code 20.25H.220.H

Reviewer: David Wong, Land Use

7.	Proposed timing or schedule (including phasing, if applicable)
	The restoration planting plan may be installed as soon as the Critical Areas Land Use Permit is approved. Irrigation should be provided during the dry season (mid-June through October).
8.	Do you have any plans for future additions, expansion or further activity related to or connected with this proposal? If yes, explain.
	No future additions or expansions are planned at this time.
9.	List any environmental information you know about that has been prepared or will be prepared, that is directly related to this proposal.
	A Critical Area Determination and Restoration Plan report, dated February 14, 2020, was been prepared by Wetland Resources, Inc.
10.	Do you know whether applications are pending for governmental approvals of other proposals directly affecting the property covered by your proposal? If yes, explain.
	No, we are not aware of any other applications or proposals that would affect the proposed restoration plan.
11.	List any government approvals or permits that will be needed for your proposal, if known.
	City of Bellevue Critical Area Land Use permit.

12. Give a brief, complete description of your proposal, including the proposed uses and the size of the project and site. There are several questions later in this checklist that ask you to describe certain aspects of your proposal. You do not need to repeat those answers on this page. (Lead agencies may modify this form to include additional specific information on project description.)

Restoration plantings will be installed within the eastern portion of King County tax parcel number 0713500050. The restoration planting area is 3,920 square feet in size. The restoration planting is designed to provide mitigation for clearing that occurred on the aforementioned King County tax parcel as well as parcels 071350TR-B and 0713500020.

13. Location of the proposal. Give sufficient information for a person to understand the precise location of your proposed project, including a street address, if any, and the section, township and range, if known. If a proposal would occur over a range of area, provide the range or boundaries of the site(s). Provide a legal description, site plan, vicinity map and topographic map, if reasonably available. While you should submit any plans required by the agency, you are not required to duplicate maps or detailed plans submitted with any permit applications related to this checklist.

The restoration plantings are proposed within the eastern portion of King County tax parcel number 0713500050. The address for the parcel is 5247 145th Place Southeast in the City of Bellevue, Washington. The site is further located as a portion of Section 22, Township 24N, Range 5E, W.M. The legal description for the parcel where the restoration plantings are proposed is: BELVEDERE TGW UND INT IN TRACT B. A site plan for the Belvedere HOA - Vegetation Restoration was submitted as part of the Critical Area Land Use permit application and is attached to this checklist as well.

#### **Environmental Elements**

#### **Earth**

1.	Ger	neral description of the site:
		Flat
		Rolling
	<b>V</b>	Hilly
	<b>7</b>	Steep Slopes
		Mountainous
		Other
2.	Wh	at is the steepest slope on the site (approximate percent slope)? <u>~80%</u>

3.	What general types of soils are found on the site (for example, clay, sand, gravel, peat, muck)? If you know the classification of agricultural soils, specify them and note any agricultural land of long-term commercial significance and whether the proposal results in removing any of these soils.
	Soils in the restoration area are mapped by the NRCS Web Soil Survey as Beausite gravelly sandy loam, 15 to 30 percent slopes. Soils observed on the site during the site visit were generally sandy.
	±
4.	Are there surface indications or history of unstable soils in the immediate vicinity? If so, describe.
	The City of Bellevue identifies the site as a very severe soil erosion hazard.
5.	Describe the purpose, type, total area and approximate quantities and total affected area of any filling, excavation and grading proposed. Indicate the source of the fill.
	No filling, excavation, or grading is proposed.

6. Could erosion occur as a result of clearing, construction or use? If so, generally describe.

No clearing, grading, or construction of any structures is proposed. A silt fence (or similar erosion control device) shall be installed at the downslope edge of the cleared area upslope of the culvert and left in place until native plant installation is complete and soils are stabilized.

7. About what percent of the site will be covered with impervious surfaces after project construction (for example, asphalt or buildings)? No impervious surfaces are proposed.

8. Proposed measures to reduce or control erosion, or other impacts to the earth, if any.

A silt fence (or similar erosion control device) shall be installed at the downslope edge of the cleared area upslope of the culvert and left in place until native plant installation is complete and soils are stabilized.

Erosion Control is regulated by BCC 23.76

#### Air

1. What types of emissions to the air would result from the proposal during construction, operation and maintenance when the project is completed? If any, generally describe and give approximate quantities if known.

Emissions related to the project will be limited to vehicles used to transport plants, compost, mulch, and other landscaping materials to the site.

2. Are there any off-site sources of emissions or odor that may affect your proposal? If so, generally describe.

No.

3. Proposed measures to reduce or control emissions or other impacts to air, if any.

None.

#### Water

- 1. Surface Water
  - a. Is there any surface water body on or in the immediate vicinity of the site (including year-round and seasonal streams, saltwater, lakes, ponds, wetlands)? If yes, describe type and provide names. If appropriate, state what stream or river it flows into.

A Type N stream (Stream A) is located downslope of the proposed restoration plantings. Stream A outflows onto the site from a culvert that runs beneath 145th place Southwest and then continues west away from the planting area. Stream A is a tributary to Coal Creek, which is located approximately 4,500 feet west of the site.

b. Will the project require any work over, in or adjacent to (within 200 feet) the described waters? If yes, please describe and attach available plans.

The proposed restoration plan is located within 200 feet of Stream A. The planting area is located as close as 10 feet from the upper limit of the on-site above ground portion of Stream A. Please see the attached site plan and Critical Area Determination and Restoration Plan for further details.

c.	Estimate the amount of fill and dredge material that would be placed in or removed from surface water or wetlands and indicate the area of the site that would be affected. Indicate the source of the fill material.
	No filling or dredging is proposed.
d.	Will the proposal require surface water withdrawals or diversions? Give a general description, purpose and approximate quantities, if known.
	No.

e. Does the proposal lie within a 100-year floodplain? No.

If so, note the location on the site plan.

f.	Does the proposal involve any discharges of waste materials to surface waters? If so, describe the type of waste and anticipated volume of discharge.
	No.
Gr	ound Water
a.	Will groundwater be withdrawn from a well for drinking water or other purposes? If so, give a general description of the well, proposed uses and approximate quantities withdrawn from the well. Will water be discharged to groundwater? Give general description, purpose, and approximate quantities if known.
	No.
b.	Describe waste material that will be discharged into the ground from septic tanks or other sources, if any (for example: Domestic sewage; industrial, containing the following chemicals; agricultural; etc.). Describe the general size of the system, the number of such systems, the number of houses to be served (if applicable), or the number of animals or humans the system(s) are expected to serve.
	No waste material will be discharged into the ground as a result of this project.

2.

- 3. Water Runoff (including stormwater)
  - a. Describe the source of runoff (including storm water) and method of collection and disposal, if any (include quantities, if known). Where will this water flow? Will this water flow into other waters? If so, describe.

Stormwater runoff generated by this project is expected to be minimal, and possibly could occur during installation of the plantings. A silt fence (or similar erosion control device) shall be installed at the downslope edge of the cleared area and upslope of the culvert the stream flows out of. These measures will be left in place until native plant installation is complete and soils are stabilized. No long term stormwater management is proposed as the project does not include installation of impervious surfaces.

	Installation	
Does the proposal alter or otherwise affect drainage patterns in the vicinity of the lf so, describe.	Could waste	materials enter ground or surface waters? If so, generally describe.
f so, describe.	No waste i	materials will be generated by the proposed project.
f so, describe.		
If so, describe.		
	Does the pro	pnosal alter or otherwise affect drainage natterns in the vicinity of the sit
No.	•	
	•	
	f so, describ	

Indicate any proposed measures to reduce or control surface, ground and runoff water, and drainage pattern impacts, if any.

Prior to site preparation and planting, a silt fence (or similar erosion control device) shall be installed at the downslope edge of the cleared area upslope of the culvert. These measures will be left in place until native plant installation is complete and soils are stabilized.

#### **Plants**

1.	Check the types of vegetation found on the site:				
	V	deciduous tree: alder, maple, aspen, other			
	V	evergreen tree: fir, cedar, pine, other			
	V	shrubs			
	grass				
		pasture			
		crop or grain			
		orchards, vineyards or other permanent crops			
		wet soil plants: cattail, buttercup, bulrush, skunk cabbage, other			
		water plants: water lily eelgrass, milfoil, other			
		other types of vegetation			
2.	Wh	nat kind and amount of vegetation will be removed or altered?			
		ne restoration plantings to be installed include evergreen and deciduous trees, a ariety of shrubs, and herbaceous plants.			
3.	Lis	t any threatened and endangered species known to be on or near the site.			
	No sit	o known threatened or endangered animal species are known to be on or near the te.			
4.	Pro	oposed landscaping, use of native plants or other measures to preserve or enhance			

vegetation on the site, if any.

The proposed planting plan includes plant species recommended in the Geologically Hazardous Areas section of the City of Bellevue's Critical Areas Handbook. Three buffer restoration areas are proposed along the slope. Restoration Area 1 is along the top of the slope and includes 5 shrub species and 1 groundcover species. Trees are absent from this restoration area to prevent future conflict with 145th Place Southeast. Restoration Area 2 is downslope of the first area and includes 2 tree species, 5 shrub species, and 1 groundcover species. Restoration Area 3 will contain four replacement trees and is located adjacent to the other restoration areas. After planting, mulch rings will be placed around each of the installed plants. Plant lists for the three restoration planting areas are included in the Critical Area Determination and Restoration Plan by Wetland Resources, Inc.

5.	List all noxious weeds and invasive species known to be on or near the site.				
	English Ivy (Hedera helix) and Himalayan blackberry (Rubus armeniacus) are located on and near the site.				
Anim	als				
1.	List any birds and other animals which have been observed on or near the site or are known to be on or near the site. Examples include:				
	Birds: ☑hawk, ☐heron, ☑eagle, ☑songbirds, ☐other				
	Mammals: ☑deer, □bear, □elk, □beaver, □other Squirrels, rabbits, raccoons, mice, skunks				
	Fish: □bass, □salmon, □trout, □herring, □shellfish, □other				
2.	List any threatened and endangered species known to be on or near the site.				
	No known threatened or endangered animal species are known to be on or near the site.				
3.	Is the site part of a migration route? If so, explain.				
	Yes. The project is located along the Pacific Flyway, which includes Alaska, Arizona, California, Idaho, Nevada, Oregon, Utah, Washington, and those portions of Colorado, Montana, New Mexico and Wyoming west of the Continental Divide. This is one of three major migratory routes in North America. The Pacific Flyway stretches 4,000 miles north-to-south and 1,000 miles east-to-west from the Arctic to the west coast of Mexico and the Rocky Mountains to the Pacific Ocean. Every year, migratory birds travel some or all of this distance both in spring and in fall, following food sources, heading to breeding grounds, or traveling to overwintering sites.				
4.	Proposed measures to preserve or enhance wildlife, if any.				
	The proposed restoration planting includes removal of invasive species and installation of native trees, shrubs, and herbaceous plants. This project will increase the quality of habitat provided on the site by increasing the diversity of native species present and native food sources.				
	<b></b>				

5.	List any invasive animal species known to be on or near the site.					
	No invasive animal species are known to be on or near the site.					
Enero	gy and Natural Resources					
	What kinds of energy (electric, natural gas, oil, wood stove, solar) will be used to meet the completed project's energy needs? Describe whether it will be used for heating, manufacturing, etc.					
	The proposed project will not require any energy sources, other than fuel for vehicles to deliver plants and landscaping materials for installation of the plantings.					
2.	Would your project affect the potential use of solar energy by adjacent properties? If so, generally describe.					
	No, the proposed project will not reduce the ability of adjacent residences to use using solar energy.					
3.	What kinds of energy conservation features are included in the plans of this proposal? List other proposed measures to reduce or control energy impacts, if any.					
	No conservation measures are proposed as the proposed project will not use any energy sources.					

# **Environmental Health**

1.	Are there any environmental health hazards, including exposure to toxic chemicals, risk of fire and explosion, spill or hazardous waste, that could occur as a result of this proposal? If so, describe.						
		No environmental health hazards will result from the installation of the restoration plantings.					
	a.	Describe any known or possible contamination at the site from present or past uses.					
		There is no known contamination on-site from present or past uses.					
	b.	Describe existing hazardous chemicals/conditions that might affect project development and design. This includes underground hazardous liquid and gas transmission pipelines located within the project area and in the vicinity.					
		There are no existing hazardous chemicals/conditions that will impact the proposed restoration plantings. No known underground utility lines are located within the planting areas.					
	c.	Describe any toxic or hazardous chemicals that might be stored, used, or produced during the project's development or construction, or at any time during the operating life of the project.					
		None.					

u.	Describe special emergency services that might be required.				
	Other than typical emergency services in the case of an injury or accident during installation of the plantings, no special services will be required for this project.				
e.	Proposed measures to reduce or control environmental health hazards, if any.				
	No environmental health hazards will result from this project.				
No	ise				
a.	What types of noise exist in the area which may affect your project (for example: traffic, equipment, operation, other)?				
	None.				
b.	What types and levels of noise would be created by or associated with the project on a short-term or a long-term basis (for example: traffic, construction, operation, other)? Indicate what hours noise would come from the site.				
	Noise created during installation of the restoration plantings will be limited to vehicles used to transport materials and landscape crew members and hand-held landscaping equipment. Work will occur during normal daylight hours, as allowed by the City of Bellevue.				
c.	Proposed measures to reduce or control noise impacts, if any.				
	The noise produced by the proposed project is equivalent to the noise created by standard residential landscaping activities, and will take place during daytime hours as allowed by the City of Bellevue. No reduction measures are proposed.				

Noise regulated by BCC 9.18

2.

# **Land and Shoreline Uses**

1.	What is the current use of the site and adjacent properties? Will the proposal affect current land uses on nearby or adjacent properties? If so, describe.				
	The site and surrounding properties are developed with single-family residences. The proposed restoration plantings will not affect current land uses of these properties.				
2.	las the project site been used as working farmlands or working forest lands? If so, escribe. How much agricultural or forest land of long-term commercial significance will be onverted to other uses as a result of the proposal, if any? If resource lands have not been esignated, how many acres in farmland or forest land tax status will be converted to non-				
	No.				
	. Will the proposal affect or be affected by surrounding working farm or forest land normal business operations, such as oversize equipment access, the application of pesticides, tilling and harvesting? If so, how?				
	No.				
3.	escribe any structures on the site.				
	No structures are currently within the restoration planting areas. Existing residences are present near the planting areas.				

4.	Will any structures be demolished? If so, what?
	No.
5.	What is the current zoning classification of the site? Single Family R-25 R-2.5
6.	What is the current comprehensive plan designation of the site? Single-Family Medium Density
7.	If applicable, what is the current shoreline master program designation of the site?
	Not applicable.
8.	Has any part of the site been classified as a critical area by the city or county? If so, specify.
	The City of Bellevue and King County have identified steep slope and soil erosion hazards on the site.
9.	Approximately how many people would reside or work in the completed project? None
10.	Approximately how many people would the completed project displace? None
11.	Proposed measures to avoid or reduce displacement impacts, if any.
	Not applicable.
12.	Proposed measures to ensure the proposal is compatible with existing and projected land uses and plans, if any.
	The proposed restoration plantings will restore vegetation on a single-family residential lot. It will not affect the use of the site.

Housing  1. Approximately how many units would be provided, if any? Indicate whether or low-income housing.  None.  2. Approximately how many units, if any, would be eliminated? Indicate whether or low-income housing.  None.  3. Proposed measures to reduce or control housing impacts, if any.  Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?  No structures are proposed.	
<ol> <li>Approximately how many units would be provided, if any? Indicate whether or low-income housing.         None.     </li> <li>Approximately how many units, if any, would be eliminated? Indicate whether or low-income housing.         None.     </li> <li>Proposed measures to reduce or control housing impacts, if any.         Not applicable.     </li> <li>Aesthetics</li> <li>What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?</li> </ol>	
<ol> <li>Approximately how many units would be provided, if any? Indicate whether or low-income housing.         None.     </li> <li>Approximately how many units, if any, would be eliminated? Indicate whether or low-income housing.         None.     </li> <li>Proposed measures to reduce or control housing impacts, if any.         Not applicable.     </li> <li>Aesthetics</li> <li>What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?</li> </ol>	
or low-income housing.  None.  2. Approximately how many units, if any, would be eliminated? Indicate whether or low-income housing.  None.  3. Proposed measures to reduce or control housing impacts, if any.  Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
2. Approximately how many units, if any, would be eliminated? Indicate whether or low-income housing.  None.  3. Proposed measures to reduce or control housing impacts, if any.  Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	high, middle,
or low-income housing.  None.  3. Proposed measures to reduce or control housing impacts, if any.  Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
3. Proposed measures to reduce or control housing impacts, if any.  Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	er high, middle,
Not applicable.  Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
Aesthetics  1. What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
What is the tallest height of any proposed structure(s), not including antenna principal exterior building material(s) proposed?	
No structures are proposed.	as; what is the
2. What views in the immediate vicinity would be altered or obstructed?	
No. This area was previously vegetate with trees. The proposed plan wivegetation to previous conditions.	II restore the

3.	Proposed measures to reduce or control aesthetic impacts, if any				
	None.				
I failes	and Clare				
	and Glare What type of light or glare will the proposal produce? What time of day, would it mainly				
1.	What type of light or glare will the proposal produce? What time of day would it mainly occur?				
	None.				
2.	Could light or glare from the finished project be a safety hazard or interfere with views?				
	None.				
3.	What existing off-site sources of light or glare may affect your proposal?				
	None.				
4.	Proposed measures to reduce or control light and glare impacts, if any.				
	None.				
Recre	eation  What designated and informal recreational opportunities are in the immediate vicinity?				
1.	Somerset East Open Space and Saddleback Mini Park are both located within the vicinity of the site.				
2.	Would the proposed project displace any existing recreational uses? If so, describe.				
	No.				

3. Proposed measures to reduce or control impacts on recreation, including recreation opportunities to be provided by the project or applicant, if any.

The proposed project will not increase the number of people living in the vicinity. No recreation opportunities will be provided by the project.

#### **Historic and Cultural Preservation**

	M -
	located on or near the site? If so, specifically describe.
	years old listed in or eligible for listing in national, state or local preservation registers
1.	Are there any buildings, structures or sites located on or near the site that are over 45

No.			

2. Are there any landmarks, features or other evidence of Indian or historic use or occupation? This may include human burials or old cemeteries. Are there any material evidence, artifacts or areas of cultural importance on or near the site? Please list any professional studies conducted at the site to identify such resources.

No.			

3. Describe the methods used to assess the potential impacts to cultural and historic resources on or near the project site. Examples include consultation with tribes and the department of archeology and historic preservation, archaeological surveys, historic maps, GIS data, etc.

The City of Bellevue map of cultural resources was reviewed. The closest mapped historical and natural heritage place is Saddleback Mini Park, approximately 2,000 feet east of the site. No historic buildings or indications of historic Native American use is identified in the vicinity of the site.

4.	Proposed measures to avoid, minimize or compensate for loss, changes to and disturbance to resources. Please include plans for the above and any permits that may be required.	
	Not applicable.	
Trans	portation	
	Identify public streets and highways serving the site or affected geographic area and describe proposed access to the existing street system. Show on site plans, if any.	
	The site is located on 145th Place Southeast. The proposed project will not connect to the existing street system and will not influence transportation in the surrounding area in any way.	
2.	Is the site or affected geographic area currently served by public transit? If so, generally describe. If not, what is the approximate distance to the nearest transit stop?	
	The site is not served by public transit. The closest bus stop is over 3,000 feet away, at the intersection of 150th Place SE and 151st Avenue SE.	
3.	How many additional parking spaces would the completed project or non-project proposal have? How many would the project or proposal eliminate?	
	No parking is proposed or will be eliminated as part of the restoration planting project.	
4.	Will the proposal require any new or improvements to existing roads, streets, pedestrian, bicycle or state transportation facilities, not including driveways? If so, generally describe (indicate whether public or private).	
	No.	

5.	Will the project or proposal use (or occur in the immediate vicinity of) water, rail or air transportation? If so, generally describe.		
	No.		
6.	How many vehicular trips per day would be generated by the completed project or proposal? If known, indicate when peak volumes would occur and what percentage of the volume would be trucks (such as commercial and non-passenger vehicles). What data or transportation models were used to make these estimates?		
	None.		
7.	Will the proposal interfere with, affect or be affected by the movement of agricultural and forest products on roads or streets in the area? If so, generally describe.		
	No.		
8.	Proposed measures to reduce or control transportation impacts, if any.		
	The proposed project will not increase the number of people living in the area. No measures to reduce transportation impacts are proposed.		

ervice

1.	Would the project result in an increased need for public services (for example: fire protection, police protection, public transit, health care, schools, other)? If so, generally describe.			
	No.			
2.	Proposed measures to reduce or control direct impacts on public services, if any.			
	None.			
Utilities				
1.	Check the utilities currently available at the site:			
	☑ Electricity			
	natural gas			
	water —			
	✓ refuse service			
	☑ telephone			
	sanitary sewer			
	septic system			
	□ other			
2.	Describe the utilities that are proposed for the project, the utility providing the service and the general construction activities on the site or in the immediate vicinity which might be needed.			
	None.			

# **Signature**

The above answers are true and complete to the best of my knowledge. I understand that the lead agency is relying on them to make its decision.

Signature Meryl Kamowski	Digitally signed by Meryl Kamowski Date: 2020.04.02 10:56:05-0700
•	
Name of signee Meryl Kamowski	
Position and Agency/Organization Senior Ecologis	t, Wetland Resources, Inc.
Date Submitted <u>3/31/2020</u>	



# CRITICAL AREA DETERMINATION AND RESTORATION PLAN

#### **FOR**

# BELVEDERE HOA – 145<sup>TH</sup> PLACE SE BELLEVUE, WA

Wetland Resources, Inc. Project #19308

# Prepared By

Wetland Resources, Inc. 9505 19th Avenue SE, Suite 106 Everett, WA 98208 (425) 337-3174

> Prepared For Belvedere HOA Attn. Xiaolong Outang 5315 145<sup>th</sup> Place SE Bellevue, WA 98006

February 14, 2020 **Revision #1: August 10, 2020** 

# **TABLE OF CONTENTS**

1.0 Introduction	
1.1 SITE DESCRIPTION	
1.2 VEGETATION CLEARING	
2.0 REVIEW OF EXISTING INFORMATION	2
3.0 Critical Area Determination	2
3.1 STREAM DETERMINATION	
3.2 WETLAND DETERMINATION	
3.3 STEEP SLOPES	
4.0 HABITAT ASSESSMENT	
4.1 VEGETATION DESCRIPTION	
4.2 SPECIES OF LOCAL IMPORTANCE	
4.3 POTENTIAL HABITAT IMPACT	5
5.0 STREAM BUFFER AND SLOPE RESTORATION PLAN	6
5.1.1 Non-native Plant Removal	
5.1.2 Planting Plan	6
6.0 MITIGATION PLANTING NOTES	-
0.0 MITIGATION PLANTING NOTES	/
7.0 MITIGATION PLAN	10
7.1 MITIGATION GOALS AND OBJECTIVES	10
7.2 Project Monitoring Program	11
7.2.2 Monitoring Reports	11
7.2.3 Project Success and Compliance	12
7.3 VEGETATION MANAGEMENT PLAN	12
7.3.2 Contingency Plan	14
7.3.3 Functions and Values Assessment	14
8.0 Use of This Report	15
0.0 Col Or This Ich Okt	1
9 0 References	16

# **LIST OF APPENDICES**

APPENDIX A: CRITICAL AREAS AND RESTORATION PLAN MAPS

#### 1.0 Introduction

Wetland Resources, Inc. (WRI) completed a site investigation on November 22, 2019. The subject site is located near the southern terminus of 145th Place Southeast in Bellevue, Washington, and is further located within Section 22, Township 24N, Range 5E, W.M. The investigation area within the subject properties includes the southern portion of King County parcel 0713500050, the entirety of parcel 071350TR-B, and the northern portion of parcel 0713500020. Please refer to Sheet 1 in Appendix A for the limits of the investigation area. The purpose of the site visit was to evaluate site conditions and locate wetlands and streams within and adjacent to the investigation area. This report discusses information on the existing conditions of the site and provides a restoration plan for two areas where existing vegetation was removed.



Figure 1 - Aerial Photo of the Subject Properties.

#### 1.1 SITE DESCRIPTION

Two of the subject properties are developed with single family residences and the other is undeveloped. The undeveloped parcel features a forested canopy composed of Douglas-fir (Pseudotsuga menziesii) and red alder (Alnus rubra). The understory is composed of Himalayan blackberry (Rubus armeniacus), salmonberry (Rubus spectabilis), and English ivy (Hedera helix). The developed parcels are vegetated with a mixture of landscaped plants and native forest that resembles the vegetation on the undeveloped site. Topography of the site generally slopes down to the west/northwest, with areas of steep slopes located throughout each of the properties. Steep slopes in the northern parcels are part of a ravine that runs east to west and contains a Type N stream (Stream A). The site is located within the Coal Creek sub-basin of the Cedar-Sammamish watershed (WRIA 8).

#### 1.2 VEGETATION CLEARING

The applicant contacted WRI to create a restoration plan for two areas of vegetation clearing identified by the City of Bellevue. The first area of clearing is west of 145th Place SE, along the eastern edge of the ravine containing Stream A and encompasses an area of approximately 3,920 square feet. The clearing consisted of cutting down several alder trees within a steep slope area and inside the Stream A buffer. This area will be restored by installing a mixture of native trees, shrubs, and groundcover species in the disturbance area. The second identified clearing is located within the southern parcel (King County #0713500020) and consisted of removing two western hemlock (*Tsuga heterophylla*) trees. The applicant is proposing to compensate for the second clearing area by planting four additional trees on the southern parcel. For further information regarding the restoration plan, please refer to Section 4 and the maps in *Appendix A* of this report.

#### 2.0 REVIEW OF EXISTING INFORMATION

Prior to conducting an on-site investigation of the project area, public resource information was reviewed to identify the presence of wetlands, streams, and other critical areas within and near the project area. The following information was examined:

- <u>U.S. Fish and Wildlife Service (USFWS) National Wetlands Inventory:</u> This resource identifies a riverine system located in the northernmost parcel in the approximate location of Stream A. The headwaters of the stream are mapped approximately 320 feet east of the site. WRI did not observe a stream channel on the east side of 145th Place SE.
- <u>USDA/NRCS Web Soil Survey:</u> The NRCS Web Soil Survey displays on-site soils as Beausite gravelly sandy loam, 15 to 30 percent slopes. This soil unit is not classified as hydric on the WA Hydric Soils List (2014).
- <u>WDFW SalmonScape Interactive Map:</u> SalmonScape identifies a seasonal stream running through the subject properties in approximately the same location as Stream A. The headwaters of the stream are mapped approximately 320 feet east of the site. WRI did not observe a stream channel on the east side of 145th Place SE.

Revision #1: August 10, 2020

- <u>WDFW Priority Habitat and Species (PHS) Interactive Map:</u> PHS does not display any priority habitats or species within or in the vicinity of the subject properties. The closest feature displayed is a biodiversity corridor approximately 3,000 feet west of the site.
- <u>King County iMap Interactive Mapping Tool:</u> The King County iMap does not display any critical areas on or in the vicinity of the subject properties.
- <u>WA-DNR Forest Practices Application Mapping Tool (FPAMT)</u>: DNR identifies a non-fish-bearing stream within the subject properties in the approximate location of Stream A. The headwaters for the stream are mapped approximately 320 feet east of the site. WRI did not observe a stream channel on the east side of 145th Place SE.
- <u>Bellevue Critical Hazards Map</u>: The Bellevue Critical Hazards Maps were reviewed to identify any hazards on and in the vicinity of the site. The Geologic Hazards map displays the entire site as a very severe soil erosion hazard. Additionally, the majority of the subject properties are mapped as steep slopes greater than 40 percent grade.

#### 3.0 CRITICAL AREA DETERMINATION

One stream (Stream A) was identified within a ravine in the northern portion of the investigation area. Additionally, steep slopes are present throughout the subject parcels and compose the banks of a ravine containing Stream A. No other critical areas were identified on or in the immediate vicinity of the investigation area during the November 2019 site visit.

#### 3.1 STREAM DETERMINATION

Streams observed on the subject property were identified using the methodologies described in the Washington State Department of Ecology (DOE) *Determining the Ordinary High Water Mark for Shoreline Management Act Compliance in Washington State* (Anderson et al. 2016). The Washington State Shoreline Management Act (SMA) defines ordinary high water mark as,

"...that mark that will be found by examining the bed and banks and ascertaining where the presence and action of waters are so common and usual, and so long continued in all ordinary years, as to mark upon the soil a character distinct from that of the abutting upland, in respect to vegetation as that condition exists on June 1, 1971, as it may naturally change thereafter, or as it may change thereafter in accordance with permits issued by a local government or the department: PROVIDED, that in any area where the ordinary high water mark cannot be found, the ordinary high water mark adjoining salt water shall be the line of mean higher high tide and the ordinary high water mark adjoining fresh water shall be the line of mean high water."

One stream (Stream A) was identified within the investigation area. Stream A is a Type N stream located in the central portion of the investigation area. The stream flows out of a culvert west of 145th Place SE and continues flowing to the west. This stream is a tributary to Coal Creek, which is located approximately 4,500 feet west of the site. The FPAMT shows a documented stream type break approximately 3,000 feet downstream from the site and classifies the on-site stream as non-fish bearing. Per Bellevue Land Use Code (BLUC) 20.25H.075, Stream A is classified as a Type

Revision #1: August 10, 2020

N water and receives a 25-foot buffer and an additional 25-foot building setback on developed parcels.

#### 3.2 WETLAND DETERMINATION

Wetland conditions, if present, were evaluated and delineated using routine methodology described in the Corps of Engineers Wetlands Delineation Manual (Final Report; January 1987), except where superseded by the 2010 Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Western Mountains, Valleys, and Coast Region (Version 2.0, referred to as 2010 Regional Supplement). Our findings are consistent with these manuals. The following criteria descriptions were used in the boundary determination of on-site wetlands:

- 1.) Examination of the site for hydrophytic vegetation (species present and percent cover);
- 2.) Examination of the site for hydric soils;
- 3.) Determining the presence of wetland hydrology

No wetlands were identified within or immediately adjacent to the investigation area. Vegetation within the investigation area includes Douglas-fir (*Pseudotsuga menziesii*), big leaf maple (*Acer macrophyllum*), red alder (*Alnus rubra*), osoberry (*Oemleria cerasiformis*), salmonberry (*Rubus spectabilis*), dull Oregon grape (*Mahonia nervosa*), sword fern (*Polystichum munitum*), and English ivy (*Hedera helix*). Ornamental species are present near the residences. Soils within the investigation area are generally a very dark brown (10YR 2/2) sandy clay loam in the upper layer with a dark yellowish brown (10YR 3/4) sandy loam below. No redoximorphic features were present in the sampled soils. Soils were generally very dry, and no primary or secondary wetland hydrology indicators were observed within the investigation area.

#### 3.3 STEEP SLOPES

The Bellevue Critical Areas Map identifies areas of steep slopes throughout the northern two parcels including along the banks of Stream A and the majority of the investigation area. In the City of Bellevue, steep slope areas are defined as areas with slope greater than 40 percent, at least 1,000 square feet, and with a rise of at least 10 feet (LUC 20.25H.120(A)(2)). Pursuant to LUC 20.25H.120(B)&(C), steep slope areas receive protective buffers of 50 feet from top-of-slope, and structure setbacks of 75 feet from toe-of-slope.

#### 4.0 HABITAT ASSESSMENT

Habitat associated with species of local importance listed in LUC 20.25H.150.B is designated as critical area, and requires a Habitat Assessment consistent with provisions listed in LUC 20.25H.165.A. Wetland Resources, Inc. performed an assessment of the subject parcels to determine the likelihood of use by these species.

#### 4.1 VEGETATION DESCRIPTION

Forested areas are present on the parcels west of 145th Place SE. Vegetation within these areas includes: big leaf maple (*Acer macrophyllum*), Douglas fir (*Pseudotsuga menziesii*), red alder (*Alnus rubra*), Oso berry (*Oemleria cerasiformis*), dull Oregon grape (*Mahonia nervosa*), Himalayan blackberry (*Rubus armeniacus*), and sword fern (*Polystichum munitum*). Vegetation near the existing residences includes maintained lawn and ornamental plants.

#### 4.2 SPECIES OF LOCAL IMPORTANCE

Forested areas on and adjacent to the subject site form high quality habitat, dominated by native upland vegetation. Multiple snags and large woody debris contribute to the varied habitat structure present, and create multiple species niches. The non-fish bearing stream provides a source of water and riparian habitat. No naturally occurring ponds are on the subject property. Forested habitat extends beyond the subject site, and is part of a forested corridor extending north and west of the site.

Deer trails and scat were observed within the western portion of the subject site, indicating frequent use. Multiple squirrel (*Sciurus* spp.) nests were noted on the west side of the site. Tree cavities ideal for roosting bats were not observed. No heron rookeries are present on site or in the immediate vicinity. No evidence was detected that would indicate use by raptor adults or juveniles on or adjacent to the subject property.

Overall, the forested areas on and adjacent to the site provide many valuable habitat functions, such as thermal and visual cover, food, water, and a movement corridor. The forested portions of the properties likely provide breeding habitat for migratory songbirds as well as habitat for a variety mammalian species such as rabbits (*Sylvilagus* spp.) and raccoons (*Procyon lotor*), although there were no direct observations of these species. No habitat features were observed that indicate use by any threatened, endangered, or locally important species.

The forested environments on and adjacent to the subject site are clearly used by a variety of wildlife species. However, the only species that afford protection to upland areas are those listed by the state or federal government as endangered or threatened or species of local importance. There is no evidence that any of these species currently use the subject site or the adjacent parcels. Further, there is no recorded information on commonly used available resources that would indicate such use.

#### 4.3 POTENTIAL HABITAT IMPACT

No direct or indirect impacts are proposed to any habitats associated with species of local importance. The proposed restoration planting includes evergreen and deciduous trees to compensate for the temporal loss of the red alder that were cut down. In addition, the removal of invasive species and installation of additional native shrubs will increase the quality of habitat provided on the site by increasing the diversity of native species present and native food sources. The proposed restoration project will not have a negative impact on any endangered, threatened, or species of local importance.

## 5.0 STREAM BUFFER AND SLOPE RESTORATION PLAN

The majority of the restoration plantings will be located west of 145<sup>th</sup> Place Southeast and will cover an area approximately 3,920 square feet in size. These plantings are located within the buffer of Stream A and in an area of steep slopes. The restoration area was previously vegetated with a canopy of red alder (*Alnus rubra*). The trees were removed in order to prevent conflict between tree branches and vehicles on 145<sup>th</sup> Place Southeast. Following tree removal, remaining vegetation in the disturbed area consists primarily of English ivy (*Hedera helix*), sword fern (*Polystichum munitum*), and sparse salmonberry (*Rubus spectabilis*). The applicant is proposing to install native vegetation to replace the downed trees. The downed trees will be left in place as they provide beneficial habitat for wildlife. Furthermore, to compensate for removing two trees east of 145<sup>th</sup> Place Southeast, four additional trees will be planted adjacent to the area where the trees were removed.

#### 5.1.1 Non-native Plant Removal

Before native plant installation, all ivy and any other invasive species will be removed from the restoration area. All ivy plant fragments shall be removed from the site. The existing sword fern and any other native plants shall be preserved in place.

## 5.1.2 Planting Plan

The proposed planting plan includes plant species recommended in the Geologically Hazardous Areas section of the City of Bellevue's Critical Areas Handbook. Three buffer restoration areas are proposed along the slope. Restoration Area 1 is along the top of the slope and includes 5 shrub species and 1 groundcover species. Trees are absent from this restoration area to prevent future conflict with 145th Place Southeast. Restoration Area 2 is downslope of the first area and includes 2 tree species, 5 shrub species, and 1 groundcover species. Restoration Area 3 will contain four replacement trees and is located on the southern parcel, north of where the two trees were removed. After planting, mulch rings will be placed around each of the installed plants (see *Planting Notes* for more detail). The attached *Buffer Mitigation Map* (Appendix A) displays the proposed plant layout. Please note that the exact quantities of plants may be adjusted at the time of installation to account for any existing native plants within the restoration areas.

## **Restoration Planting Area 1 (1,350 SF)**

Common Name	<u>Latin Name</u>	<u>Size</u>	<b>Spacing</b>	<b>Quantity</b>
Beaked hazelnut	Corylus cornuta	1 gallon	6'	12
Vine maple	Acer circinatum	1 gallon	4.5'	13
Western serviceberry	Amelanchier alnigolia	1 gallon	4.5'	13
Osoberry	Oemleria cerasiformis	1 gallon	4.5'	13
Red elderberry	Sambucus racemosa	1 gallon	4.5'	13
Sword fern	Polystichum munitum	1 gallon	4'	20

## **Restoration Planting Area 2 (2,570 SF)**

Common Name	<u>Latin Name</u>	<u>Size</u>	<b>Spacing</b>	<b>Quantity</b>
Big leaf maple	$A cer\ macrophyllum$	1 gallon	9'	20
Western red cedar	Thuja plicata	1 gallon	9'	20
Beaked hazelnut	Corylus cornuta	1 gallon	6'	15
Vine maple	Acer circinatum	1 gallon	4.5'	22
Western serviceberry	Amelanchier alnifolia	1 gallon	4.5'	22
Osoberry	Oemleria cerasiformis	1 gallon	4.5'	22
Red elderberry	Sambucus racemosa	1 gallon	4.5'	22
Sword Fern	Polystichum munitum	l gallon	3'	25

### **Restoration Planting Area 3**

Common Name	<u>Latin Name</u>	<u>Size</u>	<b>Spacing</b>	<b>Quantity</b>
Shore pine	Pinus contorta	1 gallon	~9'	4

#### **6.0 MITIGATION PLANTING NOTES**

Plant between late fall and early spring and obtain all plants from a reputable nursery. Care and handling of all plant materials is extremely important to the overall success of the project. The origin of all plant materials specified in this plan shall be native plants, nursery grown in the Puget Sound region of Washington. Some species substitution may be allowed with agreement of the contracted ecologist.

## Pre-Planting Meeting

Prior to control of invasive species or installation of mitigation plantings, a site meeting between the contracted landscaper and the consulting ecologist may occur to resolve any questions that may arise. During this meeting a discussion regarding plant spacing and proper locations of plant species will occur, as well as an inspection of the plants prior to planting. Minor adjustments to the original design may be required prior to and during construction.

#### Handling

Plants shall be handled so as to avoid all damage, including: breaking, bruising, root damage, sunburn, drying, freezing or other injury. Plants must be covered during transport. Plants shall not be bound with wire or rope in a manner that could damage branches. Protect plant roots with shade and wet soil in the time period between delivery and installation. Do not lift container stock by trunks, stems, or tops. Do not remove from containers until ready to plant. Water all plants as necessary to keep moisture levels appropriate to the species horticultural requirements. Plants shall not be allowed to dry out. All plants shall be watered thoroughly immediately upon installation. Soak all containerized plants thoroughly prior to installation.

#### Storage

Plants stored by the Permittee for longer than one month prior to planting shall be planted in nursery rows and treated in a manner suitable to those species' horticultural requirements. Plants must be re-inspected by the landscape architect prior to installation.

## Damaged plants

Damaged, dried out, or otherwise mishandled plants will be rejected at installation inspection. All rejected plants shall be immediately removed from the site, and properly replaced.

#### Plant Names

Plant names shall comply with those generally accepted in the native plant nursery trade. Any question regarding plant species or variety shall be referred to the landscape architect or consulting ecologist. All plant materials shall be true to species and variety and legibly tagged.

## Quality and condition

Plants shall be normal in pattern of growth, healthy, well-branched, vigorous, with well-developed root systems, and free of pests and diseases. Damaged, diseased, pest-infested, scraped, bruised, dried out, burned, broken, or defective plants will be rejected. Plants with pruning wounds over 1" in diameter will be rejected.

## Roots

All plants shall be balled and burlapped (B&B) or containerized, unless explicitly authorized by the landscape architect and/or consulting ecologist. Rootbound plants or B&B plants with damaged, cracked, or loose rootballs (major damage) will be rejected. Immediately before installation, plants with minor root damage must be root-pruned. Matted or circling roots of containerized plantings must be pruned or straightened and the sides of the root ball must be roughened from top to bottom to a depth of at least an inch.

## Sizes

Plant sizes shall be the size indicated in the plant schedule in approved plans, unless approved by the landscape architect or consulting ecologist. Larger stock may be acceptable provided that it has not been cut back to the size specified, and that the root ball is proportionate to the size of the plant. Smaller stock may be acceptable, and preferable under some circumstances, based on sitespecific conditions. Measurements, caliper, branching, and balling and burlapping shall conform to the American Standard of Nursery Stock by the American Association of Nurserymen (latest edition).

## Form

Evergreen trees shall have single trunks and symmetrical, well-developed form. Deciduous trees shall be single trunked unless specified as multi-stem in the plant schedule. Shrubs shall have multiple stems and be well-branched.

## Timing of Planting

Unless otherwise approved by the landscape designer/consulting ecologist, all planting shall occur between October 1 and March 1. Overall, the earlier the plants go into the ground during the dormant period, the more time they have to adapt to the site and extend their root systems before the water demands of summer.

## Weeding

Non-native, invasive vegetation in the mitigation area will be hand-weeded from around all installed plants at the time of installation and on a routine basis throughout the monitoring period. No chemical control of vegetation on any portion of the site is recommended without prior approval from the City and consulting ecologist.

#### Site conditions

The landscaping contractor shall immediately notify the landscape designer and/or consulting ecologist of drainage or soil conditions likely to be detrimental to the growth or survival of plants. Planting operations shall not be conducted under the following conditions: freezing weather, when the ground is frozen, excessively wet weather, excessively windy weather, or in excessive heat.

## Planting Pits

Planting pits shall be circular or square with vertical sides, and shall be at least 12" wider in diameter than the root ball of the plant. Break up the sides of the pit in compacted soils. Set plants upright in pits. All burlap shall be removed from the planting pit/rootball. Backfill of native soils shall be worked back into holes such that air pockets are removed without adversely compacting soils.

#### Fertilizer

Slow release fertilizer may be used if pre-approved by the landscape architect and consulting ecologist. Fertilizers shall be applied only at the base of plantings underneath the required covering of mulch (that does not make contact with stems of the plants). No fertilizers shall be placed within planting holes.

## Support Staking

Most shrubs and many trees DO NOT require any staking. If the plant can stand alone without staking in a moderate wind, do not use a stake. If the plant needs support, then strapping or webbing should be used as low as possible on the trunk to loosely brace the tree with two stakes. Do not brace the tree tightly or too high on the trunk. If the tree is unable to sway, it will further lose the ability to support itself. Do not use wire in a rubber hose for strapping as it exerts too much pressure on the bark. As soon as supporting the plant becomes unnecessary, remove the stakes. All stakes must be removed within two (2) years of installation.

#### Arrangement and Spacing

The plants shall be arranged in a pattern with the appropriate numbers, sizes, species, and distribution that are required in accordance with the approved plans. The actual placement of individual plants shall mimic natural, asymmetric vegetation patterns found on similar undisturbed

sites in the area. Spacing of the plantings may be adjusted to maintain existing vegetation with the agreement of the landscape designer and/or consulting ecologist.

## Compost

If native soils appear unsuitable for the long term survival of installed plant material, organic compost will be added to the planting area.

### Mulching

Mulch (woodchip/arborist) shall be applied in three-foot diameter rings around each of the installed plants. Mulch shall be no less than 3 inches deep, and shall be kept 2 inches away from the trunks/stems of installed plants to prevent damage.

#### Erosion and Sediment Control Plan

A silt fence (or similar erosion control device) shall be installed at the downslope edge of the cleared area upslope of the culvert and left in place until native plant installation is complete and soils are stabilized.

#### 7.0 MITIGATION PLAN

## 7.1 MITIGATION GOALS AND OBJECTIVES

• Objective 1 – Restore native vegetation within cleared areas of stream buffer and steep slopes.

> Performance Standard 1: 100 percent survival rate of the planted species within the first year of planting

Performance Standard 2: 80 percent survival rate of the planted species at the end of the five-year monitoring period

Objective 2 – Control invasive species within the native vegetation restoration areas

Performance Standard 3: 0 percent invasive species present within the restoration areas at the end of the first year of planting

Performance Standard 4: Maximum 15 percent invasive species present within the restoration areas at the end of the five-year monitoring period

The goal of the restoration plan is to re-vegetate the stream buffer and steep slope area previously cleared as well as provide compensation for the temporal loss of removing two hemlock trees. The restoration plantings will increase vegetative species diversity, reduce erosion potential, and decrease invasive and non-native plant cover without harming steep slope areas.

To achieve this goal, non-native plants will be carefully removed from the steep slope and buffer areas, and diverse native vegetation will be installed.

## 7.2 Project Monitoring Program

Monitoring shall be conducted annually for five years in accordance with the approved Buffer Restoration Plan.

Requirements for monitoring project:

- 1. Initial compliance report/as-built map
- 2. Annual site inspection (once per year) for five years
- 3. Annual reports including final report (one report submitted in the fall of each monitored year)

## Purpose for Monitoring

The purpose for monitoring shall be to evaluate the project's success. Success will be determined if monitoring shows at the end of five years that the definitions of success stated below are being met. Access shall be granted to the planting area for inspection and maintenance to the contracted landscaper and/or ecologist and the City during the monitoring period or until the project is evaluated as successful.

## Vegetation Monitoring

Vegetation monitoring data shall be collected throughout the mitigation site, and detail groundcover, shrub, and tree coverage and species survival. At least two photo points will be established, from which photos of the mitigation site shall be taken throughout the monitoring period. Photo point locations and directions must be identified on the as-built map (may be hand drawn on approved maps/plans). Vegetation monitoring shall occur annually between August 1 and September 30 (prior to leaf drop), unless otherwise specified.

## 7.2.2 Monitoring Reports

Monitoring reports shall be submitted by December 31 of each year during the monitoring period. As applicable, monitoring reports must include descriptions/data for:

- (1) Site plan and vicinity map;
- (2) Historic description of project, including date of installation, current year of monitoring, restatement of planting/restoration goals, and performance standards;
- (3) Plant survival, vigor, and areal coverage for every plant stratum (sampling point data), and explanation of monitoring methodology in the context of assessing performance standards;
- (4) Slope condition and site stability;
- (5) Overall buffer conditions, e.g., surrounding land use, use by humans and/or wildlife;
- (6) Observed wildlife, including amphibian, avian, and others;
- (7) Assessment of invasive biota and recommendations for management;
- (8) Color photographs taken from permanent photo points that shall be depicted on the monitoring report map.

## 7.2.3 Project Success and Compliance

Upon installation and completion of the approved mitigation plan, an inspection by a qualified ecologist and/or City will be made to determine plan compliance. A compliance report will be supplied to the City of Bellevue within 30 days of the completion of planting. The Applicant or consulting ecologist/landscape designer will perform condition monitoring of the plantings before October of each year for five years. A written report describing the monitoring results will be submitted to the City after each site inspection of each monitored year. Final inspection will occur five years after completion of this project, and a report on overall project its success will be prepared.

## Performance Standards

Project success will be measured by native species survival and richness, and areal cover of native and invasive plants. The mitigation area must achieve the following Performance Standards to be considered successful:

	Year 1	Year 3	Year5
Installed Plant Survival	100%	$90^{\circ}/_{\circ}$	80%
Invasive/Non-native species cover	<5%	<5%	<5%

#### Assurance Device

The City of Bellevue may require a performance or maintenance assurance device if it is determined to be necessary. The City will determine the type and amount of assurance device required. The performance or maintenance assurance device amount is typically determined from the estimated cost of work. An estimate of the cost of project installation is provided below.

Cost of Plants and Labor	
1-gal plants (\$11.50 per plant x 256 plants)	\$2,944.00
Cost of Mulch	
(\$3.25/sq.yd. x 185 sq.yd)	\$601.25
TOTAL ESTIMATED COST	\$3,545.25

#### 7.3 VEGETATION MANAGEMENT PLAN

This mitigation project will require periodic maintenance to replace mortality of planted species and control invasive, non-native plant species, and other undesirable competing species. The mitigation planting areas will be maintained (at a minimum) in spring and late summer of each year for the five-year monitoring period. Maintenance may include, but will not be limited to, removal of competing species and non-native vegetation (by hand if necessary), irrigation, replacement of dead plants, and/or the replacement of mulch during each maintenance period. The Applicant is responsible for ensuring maintenance occurs in all monitoring years.

#### Duration and Extent

In order to achieve performance standards, the Permittee shall have the planting area maintained for the duration of the five-year monitoring period. Maintenance will include: watering, weeding around the base of installed plants, pruning, replacement, re-staking, removal of all classes of

Belvedere HOA 12 WRI #19308 noxious weeds (see Washington State Noxious Weeds List), and any other measures needed to insure plant survival.

#### Survival

The Permittee shall be responsible for the health of 100 percent of all newly installed plants for *one growing season* after installation has been accepted by the City. A growing season for these purposes is defined as occurring from spring to spring (March 15 to March 15 of the following year). For fall installation (often required), the growing season will begin the following spring. The Permittee shall replace any plants that are failing, weak, defective in manner of growth, or dead during this growing season.

## Installation Timing for Replacement Plants

Replacement plants shall be installed between October 1 and March 1, unless otherwise determined by the consulting ecologist and/or City staff.

## Standards for Replacement Plants

Replacement plants shall meet the same standards for size and type as those specified for the original installation unless otherwise directed by the landscape designer, consulting ecologist, and/or City staff.

#### Mulch

All plantings will have wood chip mulch reapplied at their bases for at least the first two growing years of the monitoring period. Plants shall receive no less than 3 inches of wood chips (a.k.a. arborist mulch). Mulch shall be kept well away (at least 2 inches) from the trunks and stems of woody plants.

#### Herbicides/Pesticides and Fertilizer

Chemical control of invasive, non-native species, if necessary, shall be applied only after approval by the City of Bellevue or consulting ecologist. Herbicide shall be applied by a licensed applicator following all label instructions. Chemical control and fertilization within the mitigation areas will only be performed if deemed necessary.

#### Watering/Irrigation

Water should be provided during the dry season (~July 1 through September 15) to insure plant survival and establishment. Water should be applied at a rate of one inch of water twice per week during the dry season. The landscaping contractor and/or property owners will determine if additional watering is necessary. Due to the steep slopes on the site, hand watering or a drip system, that waters for short periods at a time, shall be used to prevent any erosion or slope stability issues.

## Pruning of Existing Trees

In the future, if it is necessary to prune the existing trees away from 145th Place SE, individual branches will be removed, leaving the tree(s) intact. Should the need to remove a tree arise, the

property owners will comply with the current City of Bellevue regulations for vegetation removal in critical areas and/or buffers at that time.

## 7.3.2 Contingency Plan

If, during any of the annual inspections, performance standards are not being met for species survival, additional plants of the same species will be added to the mitigation area. If invasive, non-native species exceed 5 percent cover (as measured by areal cover), manual control shall occur. If any of these situations persist to the next inspection, a meeting with the landscape designer/consulting ecologist and the Permittee will be held to decide upon contingency plans. Elements of a contingency plan may include, but will not be limited to: more aggressive weed control, mulching, replanting with larger plant material, species substitution, fertilization, soil amendments, and/or irrigation.

#### 7.3.3 Functions and Values Assessment

The restoration area was previously vegetated with a canopy of red alder (*Alnus rubra*), with English ivy (*Hedera helix*), swordfern (*Polystichum munitum*), and sparse salmonberry (*Rubus spectabilis*) in the understory. While this area was forested, it lacked a diverse understory and provided limited native food sources for wildlife.

The proposed restoration plantings include evergreen and deciduous trees, several species of fruiting shrubs, and sword ferns. These plantings will increase the diversity of the forested canopy as well as the shrub understory of this area. The plantings will provide an increase of available native food sources as well. Installation of the restoration plantings and implementation of the vegetation management plan will allow the restoration areas to provide increased erosion control on the slope and increase the quality of wildlife habitat provided on the subject site.

## 8.0 Use of This Report

This Critical Area Determination and Restoration Plan is supplied to the Belvedere Homeowners Association as a means of determining on-site critical area conditions and compensatory mitigation for vegetation clearing, as required by the City of Bellevue. This report is based largely on readily observable conditions and, to a lesser extent, on readily ascertainable conditions. No attempt has been made to determine hidden or concealed conditions.

The laws applicable to wetlands are subject to varying interpretations and may be changed at any time by the courts or legislative bodies. This report is intended to provide information deemed relevant in the applicant's attempt to comply with the laws now in effect.

The work for this report has conformed to the standard of care employed by wetland ecologists. No other representation or warranty is made concerning the work or this report, and any implied representation or warranty is disclaimed.

Wetland Resources, Inc.

Eamonn Collins
Associate Ecologist

Meryl Kamowski Senior Ecologist

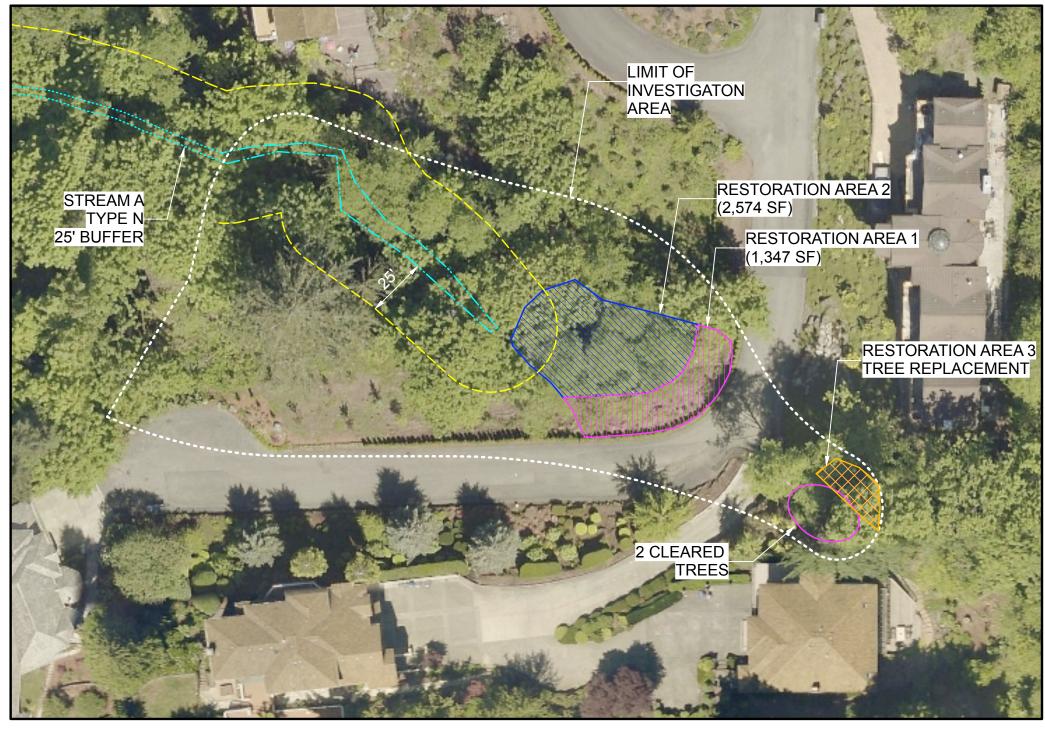
Mengl A. Kamonghi

## 9.0 REFERENCES

- Bellevue, City of. Bellevue Land Use Code. Chapter 20.25: Special and Overlay Districts, Passed November 21, 2016.
- Bellevue, City of. 2020. City of Bellevue Critical Hazards Maps. http://cobgis.maps.arcgis.com/home/item.html?id=8a2e50c0ce6d473f93054798085ff30f
- Bellevue, City of. Critical Areas Handbook. Prepared by City of Bellevue and The Watershed Company.
- Cowardin, et al., 1979. Classification of Wetlands and Deepwater Habitats of the United States. U.S. Department of the Interior. FWS/OBS-79/31. December 1979.
- King County. 2020. King County iMap Interactive Mapping Tool. http://www.kingcounty.gov/operations/GIS/Maps/iMAP.aspx
- Lichvar, R.W., M. Butterwick, N.C. Melvin, and W.N. Kirchner. 2014. The National Wetland Plant List: 2014 Update of Wetland Ratings. Phytoneuron 2014-41: 1-42.
- Munsell Color, 2012, Munsell Soil Color Book, Munsell Color, Grand Rapids, MI.
- Natural Resources Conservation Service (NRCS). 2018. Web Soil Survey. U.S. Department of Agriculture. http://websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx.
- U.S. Army Corps of Engineers. 2010. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Western Mountains, Valleys, and Coast Region (Version 2.0). Vicksburg, MS
- U.S. Department of Agriculture, Soil Conservation Service. Washington, D.C. Soil Survey of King County Area Washington. November 1973.
- U.S. Fish & Wildlife Service. 2020. National Wetlands Inventory (NWI) Online Mapper. http://www.fws.gov/wetlands/Data/Mapper.html.
- WA Department of Fish & Wildlife. 2020a. Priority Habitat and Species (PHS) Interactive Map. http://apps.wdfw.wa.gov/phsontheweb/.
- WA Department of Fish & Wildlife. 2020b. <u>SalmonScape Online Mapping Application</u>. http://apps.wdfw.wa.gov/salmonscape/map.html.

## CRITICAL AREAS AND RESTORATION MAP <u>BELVEDERE HOA - 145TH PL SE</u>

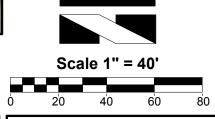
PORTION OF SECTION, TOWNSHIP N, RANGE E, W.M.



PLEASE NOTE: STEEP SLOPES ARE LOCATED THROUGHOUT THE INVESTIGATION AREA, INCLUDING WITHIN THE RESTORATION PLANTING AREAS. THE STREAM AND LIMITS OF CLEARING WERE LOCATED USING A HANDHELD GPS UNIT.



Phone: (425) 337-3174 Fax: (425) 337-3045 Email: mailbox@wetlandresources.com

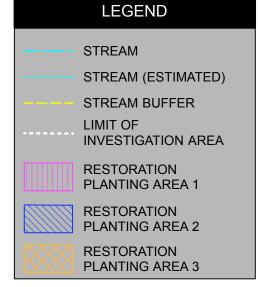


Critical Area and Restoration Plan Map

<u>Belvedere HOA - 145TH Place SE</u>

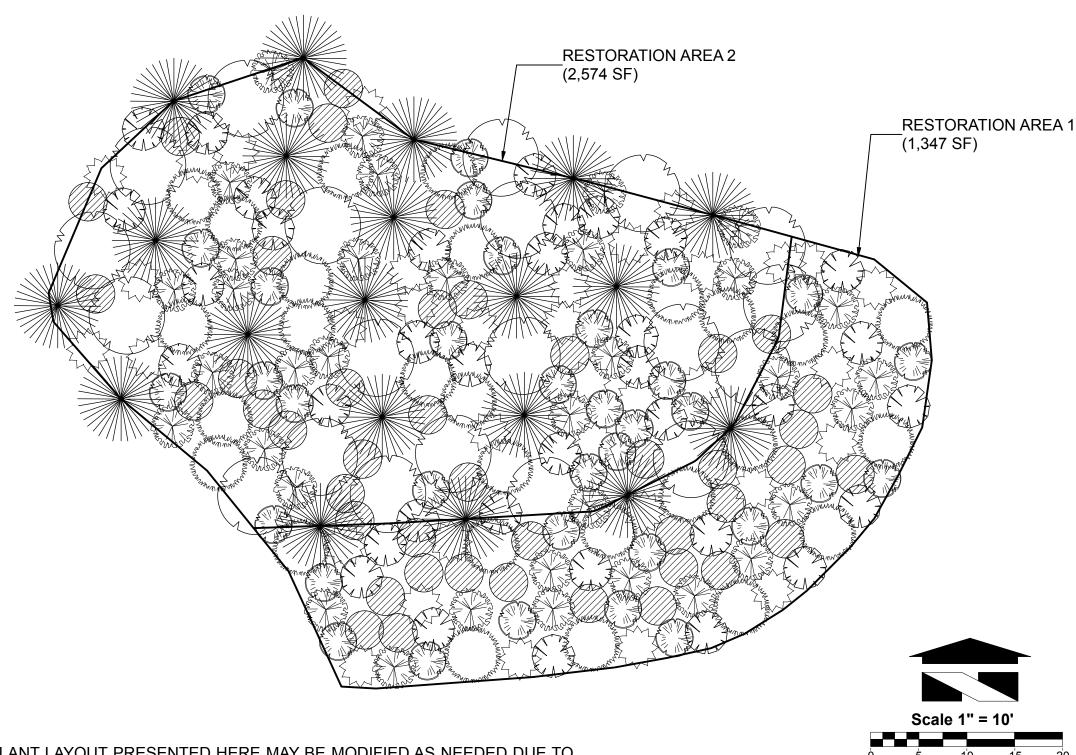
City of Bellevue

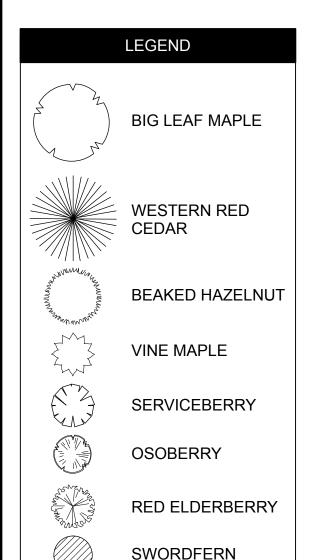
Belvedere HOA Attn. Xiaolong Ouyang 5315 145th Place SE Bellevue, WA 98006 Sheet 1/2 WRI #: 19308 Drawn by: EC Date: 2/14/2020 Rev.#1: 8/10/2020



# RESTORATION PLANTING PLAN MAP <u>BELVEDERE HOA - 145TH PL SE</u>

PORTION OF SECTION, TOWNSHIP N, RANGE E, W.M.





PLEASE NOTE: THE PLANT LAYOUT PRESENTED HERE MAY BE MODIFIED AS NEEDED DUE TO EXISTING NATIVE VEGETATION WITHIN THE RESTORATION AREAS AT THE TIME OF INSTALLATION. THE LOCATION OF THE FOUR TREES SCHEDULED TO BE PLANTED IN RESTORATION AREA THREE WILL BE DETERMINED AT THE TIME OF PLANT INSTALLATION AS THEY WILL BE INTERSPERSED WITHIN EXISTING VEGETATION. ADDITIONAL INFORMATION INLUDING SITE PREPARATION, PLANTING LISTS, AND RESTORATION PLAN DETAILS ARE PROVIDED IN THE CRITICAL AREA DETERMINATION AND RESTORATION PLAN REPORT.

## Wetland Resources, Inc.

Phone: (425) 337-3174
Fax: (425) 337-3045
Email: mailbox@wetlandresources .com

Restoration Planting Plan Map <u>Belvedere HOA - 145TH Place SE</u> City of Bellevue

Belvedere HOA Attn. Xiaolong Ouyang 5315 145th Place SE Bellevue, WA 98006 Sheet 2/2 WRI #: 19308 Drawn by: EC Date: 2/14/2020 Rev.#1: 8/10/2020